

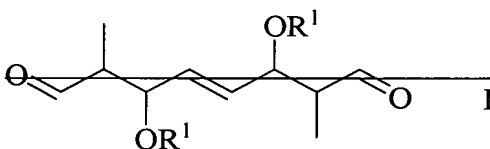
## IN THE SPECIFICATION

Please replace the abstract at page 15 with the following Replacement Abstract, which appears at the end of this paper.

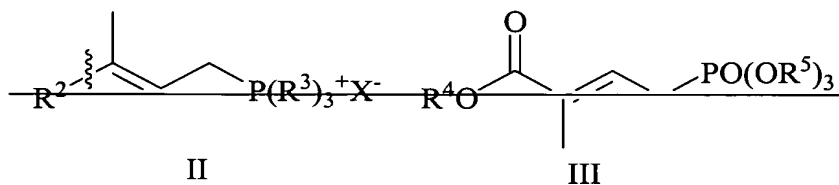
### Abstract

A process for preparing carotenoids, in which the process includes reacting a dialkoxy dialdehyde in a double Wittig condensation with a phosphonium salt of or in a double Wittig-Horner condensation with a phosphonate. The carotenoids include, for example,  $\beta$ -carotene, zeaxanthin, canthaxanthin, astaxanthin, lycopene and croceptin, which are useful as nutraceuticals, food colorants, and feed additives.

~~The invention relates to a process for preparing carotenoids, which comprises reacting a dialkoxy dialdehyde of the general formula I~~

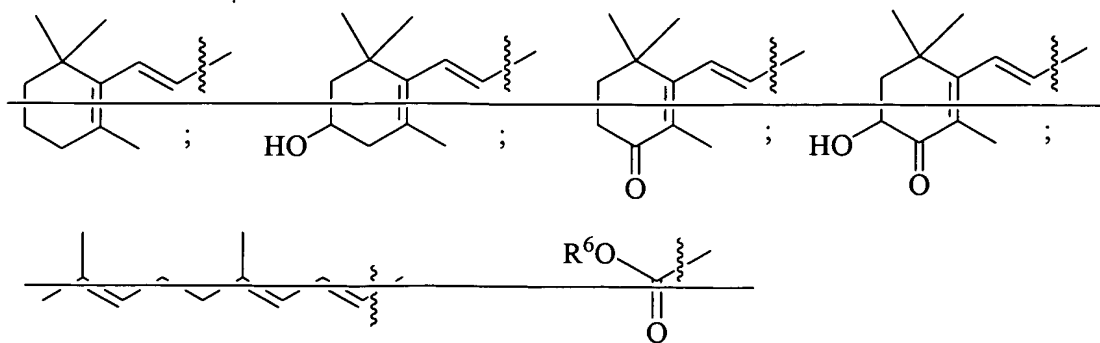


~~with  $R^1 = C_1-C_6$ -alkyl, in a double Wittig condensation with a phosphonium salt of the formula II or in a double Wittig-Horner condensation with a phosphonate of the formula III~~



~~in which the substituents have independently of one another the following meaning~~

$R^2$



$R^3$ —aryl;

$R^4$ —to  $R^6$

$C_4$ — $C_6$ —alkyl and

$X^-$ —an anion equivalent of an inorganic or organic acid.